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Slagle

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[54] **EXERCISE DEVICE**

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[52] **U.S. Cl.** **272/97;** 172/145

[58] **Field of Search** ..... 272/97, 145, 55.5 SS, 272/56, 144; 46/147, 16, 17; 403/121, 256, 346, 347

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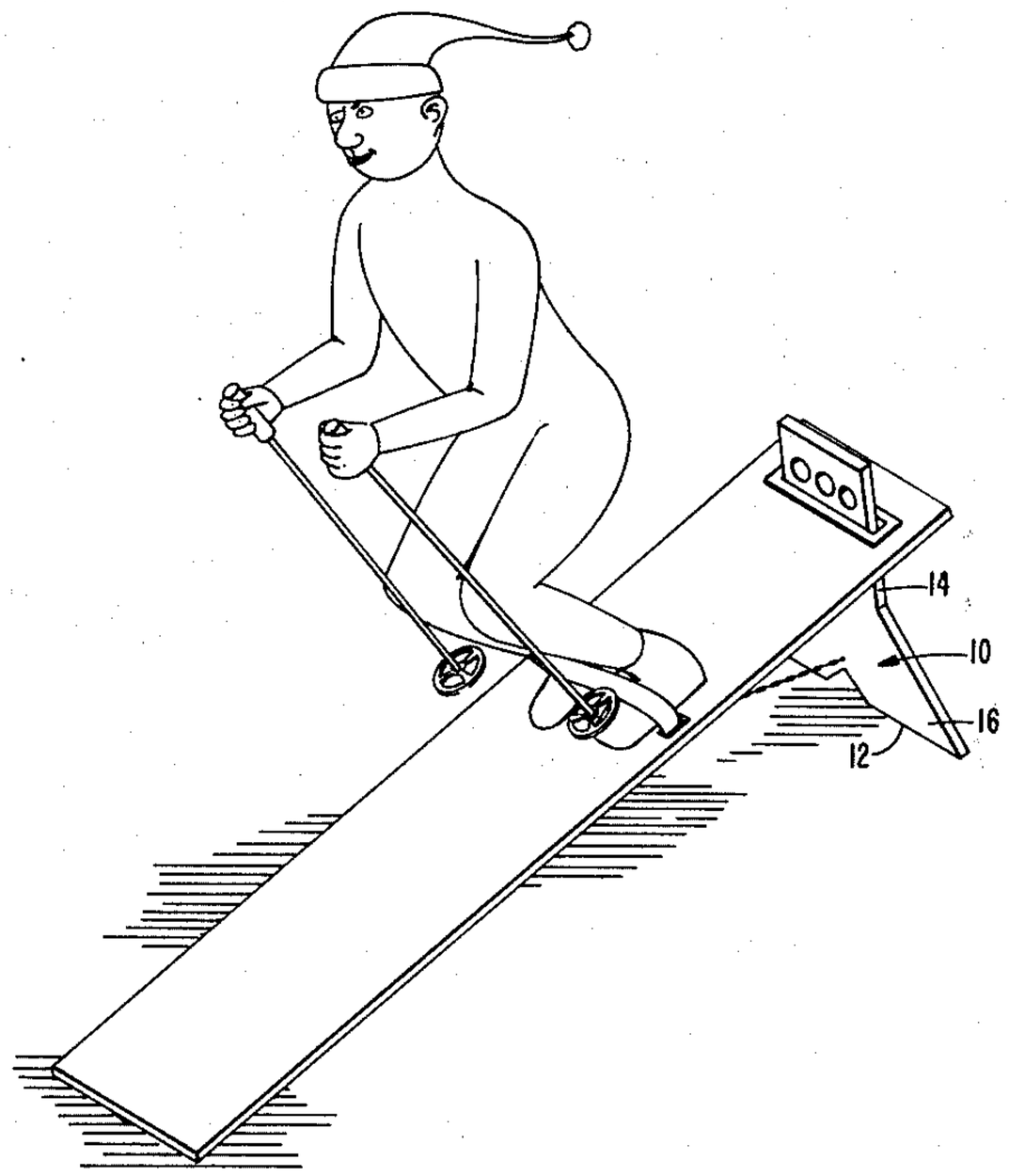
[57] **ABSTRACT**

An exercise device is provided which simulates the action of skiing for training and developing the muscles used in skiing. The device includes a leg having at least one aperture into which a round peg is inserted. A board is provided which has a slot which fits over the leg and rests on the peg. The end of the board is pivotally rested on the floor. Straps are provided to hold the user's feet. The board wll rock back and forth in a limited manner when user is on it, simulating a ski action. Several apertures may be provided to change the position of the peg and hence the action of the board.

4 Claims, 3 Drawing Figures



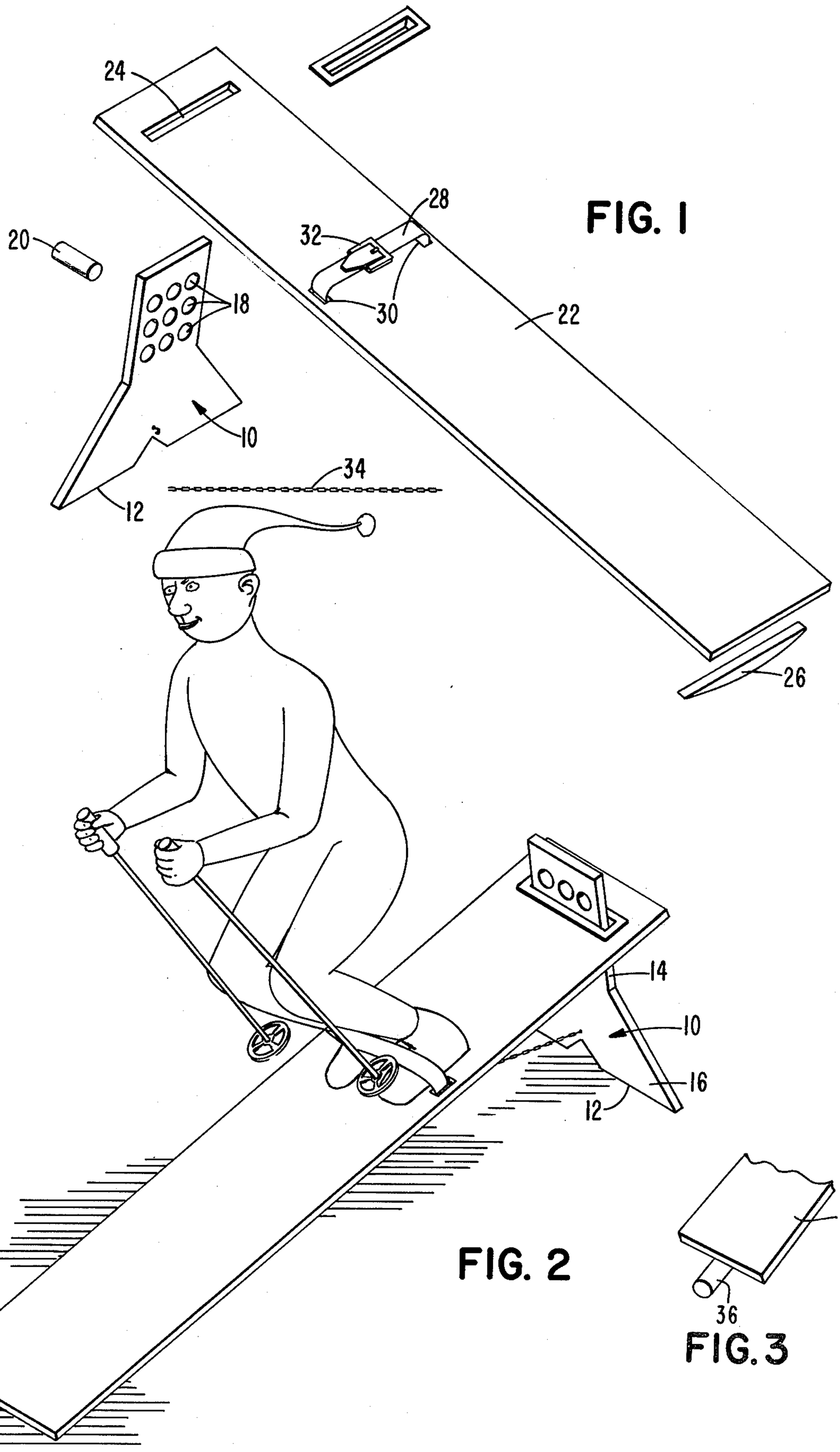


FIG. 1

FIG. 2

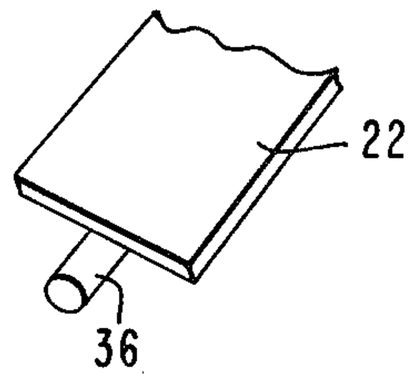


FIG. 3

EXERCISE DEVICE

BACKGROUND OF THE INVENTION

This invention relates generally to balance training devices, and more particularly to a balance training board and leg structure especially adapted for use as a device for developing balancing skills used in skiing.

The acquisition and development of balancing skills is especially necessary in learning and developing the art of skiing. Generally, in the past it has not been practical to develop these special skills except by actually practicing on skis under actual skiing conditions. There have been some prior art suggestions of balance training devices, but these have not closely simulated actual skiing conditions, and hence, have not had great value in providing the necessary balance training for developing the skills necessary for skiing.

SUMMARY OF THE INVENTION

According to the present invention, a balance training device is provided which has a support leg for resting on a surface. The leg has at least one aperture. A balance board is provided with a slot to fit over the support leg. A pin is provided which fits into the aperture and supports one end of the board while the other end of the board rests on the support surface. Foot engaging means, such as straps with a buckle are provided to engage the feet of a user.

DESCRIPTION OF THE DRAWING

FIG. **1** is an exploded view of the device of the present invention;

FIG. **2** is an assembled view of the device of the present invention showing it in use; and

FIG. **3** is a view of an alternative support for the end of the board.

DESCRIPTION OF THE PREFERRED EMBODIMENT

Referring now to the drawing, a balance training device according to this invention is shown. The device is preferably utilized for balance training for skiing, and will be so described, but its use is not specifically limited thereto.

The device includes a support leg **10** having one flat end **12** configured to rest firmly on a support surface, such as the floor of a room, or any other flat surface. The leg **10** has a narrow upper portion **14**, and a flared lower portion **16**, terminating at the flat end **12**. The upper portion **14** of the leg **10** is provided with a series of aperture **18** passing therethrough, the aperture being adapted to removably receive a support peg **20**. The peg **20** is configured to fit snugly into each aperture so that it will not easily drop out, but not so tightly that it cannot be readily removed for adjustment of the board, as will be described presently.

A balance board **22** is provided, which is a flat board generally about five to seven feet long. The board **22** has a slot **24** formed near one end thereof, which is configured to fit over the top portion **14** of the leg **10**. The length of the slot is somewhat longer than the width of the upper portion **14** of the leg **10**. The opposite end of the board **22** has a rounded, or other non-flat support or pivot member **26** on the lower side thereof, adapted to support that end of the board on a surface for a side-to-side rocking movement. Alternatively this pivot member **26** may be formed as a separate element

as shown in FIGS. **3**; such as a cylindrical pin **36** which can be removably positioned under the end of the board to provide the required rocking or pivoting movement of the board.

The board **22** is assembled onto the leg **10** by placing the slot over the top portion **14** of the leg **10** and selecting the desired aperture for the peg **20**, and inserting the peg **20** therein, extending from the aperture and then resting the board thereon. The pivot member **26** of the board will rest on the support surface. The board, as thus supported, is free to pivot laterally to a limited extent depending upon the relative size of the slot **24** and width of the upper portion **14** of the leg **10** and the configuration of the pivot member **26**. The choice of the positioning of the peg **20** will be described presently.

The board **22** is provided with foot engaging means in the form of a strap **28**, passing through openings **30** in the board and having a buckle **32** disposed to tighten the strap over the feet of a user of the device to secure him thereon as shown in FIG. **2**. A safety chain **34** is secured at one end to the leg **10** and at the other end to the underside of the board **22** to prevent inadvertent collapse of the device when in use.

OPERATION

To use the device, it is assembled as shown, with the board **22** supported on the peg **20** in one of the aperture **18**. The user straps his feet to the board with the strap **28**, and thus is in a position which simulates "heading down hill." The steepness of the "hill" is controlled by the angle of the board which in turn depends on how high an aperture **18** is chosen for the peg **20**. The action of the board on the peg **20** and pivot member **26** tends to cause the board to pivot laterally, the board being unstable laterally because of this type of support. This lateral pivoting can be controlled by the user in a way which allows the user to exercise the various movements, or techniques utilized for making various turns on skis. The slope of the board, or course, simulates the downhill posture during skiing.

Further, by changing the lateral position of the peg, an unbalanced-left, or unbalanced-right condition may be created, which will tend to favor one leg or the other.

Hence, by using the balance device of this invention, thus a person, in a short period of time, can improve his skiing techniques.

What is claimed is:

1. A balance training device for a skier comprising a support leg configured to rest on a support surface,

a balance board,

means to support one end portion of said balance board on said support leg above said support surface at a plurality of positions thereon, with the other end on the support surface permitting limited lateral rocking motion of the board with respect to said support leg and the support surface, said means including a through slot formed in said one end portion of the board configured to slide over said leg, and peg means to support the board on said leg, said leg including a plurality of holes arranged for different vertical and horizontal positions of said peg means with respect to said board, and said peg means removably replaceable in said holes to vary the position of support of said board,

means to interconnect said board and said leg to prevent collapse,

and foot engaging means on said board.

2. The invention, as defined in claim 1, further characterized by pivot means on said other end of said board for engagement on said support surface.

3. The invention, as defined in claim 2, wherein Said pivot means includes a separate cylinder.

4. The invention, as defined in claim 1, wherein said foot engaging means includes strap means to secure feet to the board.

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